TABLES

Table 1-1
Summary of Compliance
January 2007

Extraction Well Network	Compliance Criteria Met (yes/no)	Comments
Flow Rate Performance - Target Extraction Rate		
Newmark North Extraction Well Network	No	The City is unable to sustain the three month rolling average Target Extraction Rate for the Newmark North extraction well network (see Table 2-3). A letter informing the EPA and DTSC of this condition was sent out on July 25, 2005. An evaluation of the conditions causing this flow rate variance was submitted December 6, 2005. The City, consistent with the SOW, has proposed extraction rates more compatible with aquifer conditions, extraction rates with which it is currently complying.
Newmark Plume Front Extraction Well Network	NA	Flow rate performance criteria are not applicable until the Muscoy OU is declared Operational and Functional
Muscoy Plume Extraction Well Network	NA	Flow rate performance criteria are not applicable until the Muscoy OU is declared Operational and Functional
Flow Performance - Particle Tracking		
Newmark Plume Front Extraction Well Network	NA	Flow performance criteria for the Newmark OU IRA are not applicable until particle tracking methodology proposed in the Operational Sampling and Analysis Plan is approved.
Muscoy Plume Extraction Well Network	NA	Flow performance criteria are not applicable until the Muscoy OU is declared Operational and Functional and the addendum OSAP is approved.
Contaminant Performance - Down gradient Monitoring Wells		
Newmark Plume Front Extraction Well Network	Yes	Validated November 2005 sampling results for the Newmark Plume Front monitoring wells was reported in the September 2006 Progress Report. Contaminant performance criteria stipulated in the SOW were met for the subject downgradient monitoring wells.
Muscoy Plume Extraction Well Network	NA	Contaminant performance criteria are not applicable until the Muscoy OU is declared Operational and Functional

Notes:
NA - not applicable (see comment for reason)

Table 2-1
Summary of Newmark OU O&M - Extraction Wells

Reporting Period: January 1, 2007 through January 31, 2007
System Operational & Functional Date: October 1, 2000 (1)
Operations Completed: 6 years 4 months

Newmark North Plant Extraction Well Network (EPA 006, EPA 007, Newmark 3)	
Description Routine Maintenance Performed	Daily equipment checks performed (see DHS report), monthly hands on physical, annual oil change, semi-annual check of VFD
Description of Problems Encountered	Unable to meet Target Extraction Rate due to sustainable yield issues.
Description of Process Improvements Implemented	EPA approval of target extraction rate is pending (see below)
Deviations from the Operational Requirements of the Consent Decree	Unable to meet the three month rolling average Target Extraction Rate (see notification letter to the EPA/DTSC dated July 25, 2005). North Plant Sustainable Rate letter was submitted to EPA/DTSC on December 6, 2005 seeking a downward adjustment in the Target Extraction Rate to conform extraction rates to historical performance of the wells and declining water levels in the area. Current production is in compliance with the proposed revised production limit.
Newmark Plume Front Extraction Well Network (EPA 001, EPA 002, EPA 003, EPA 004, EPA 005)	
Description Routine Maintenance Performed	Daily equipment checks performed (see DHS report), monthly hands on physical, annual oil change, semi-annual check of VFD. Monitoring well moisture prevention and venting applications.
Description of Problems Encountered	Not able to maintain the Design Extraction Rate. EPA003 out of service for equipment change out beginning 12/11/06. Estimated return to service date 2/14/07. EPA005 out of service to re-pipe to Waterman system 1/12-23/07.
Description of Process Improvements Implemented	The flow rate in EPA002, EPA004 and EPA005 was increased to partially compensate for the lost flow at EPA003. SBMWD is in the process of installing new equipment in EPA003 to facilitate higher extraction rates.
Deviations from the Operational Requirements of the Consent Decree	None

(1) The USEPA declared the Newmark OU Operational and Functional on October 1 ,2000.

Table 2-2
Summary of Extraction Well Flow Data
January 2007

Extraction Well	Monthly Extracted Water Volumes (acre-ft)	Average Monthly Flow Rate (gpm)	Cumulative Volume Extracted[(1)] (acre-ft)	Number of Days in Month =	31
				Monthly Run Time (days)	Monthly Down Time (days) [(2)]
Newmark North Plant Extraction Well Network					
EPA 006	109.0	796	4,856	31.1	-0.1
EPA 007	193.5	1,412	10,187	31.1	-0.1
Newmark 3	137.2	1,001	7,050	31.1	-0.1
Network Total	**439.7**	**3,209**	**22,093**		
Newmark Plume Front Extraction Well Network					
EPA 001	188.5	1,376	12,731	29.3	1.7
EPA 002	207.0	1,511	14,047	30.9	0.1
EPA 003	0.0	0	15,015	0.0	31.0
EPA 004	212.6	1,552	14,833	30.7	0.3
EPA 005	136.7	998	13,788	18.7	12.3
Network Total	**744.8**	**5,436**	**70,415**		

Notes:

Per the terms of the Statement of Work, once Muscoy is declared O&F the City will be required to demonstrate flow compliance with each extraction well networks Target Extraction Rates considering the specified maintenance allowances. At such time the City will provide the supporting calculations in a tabular format.

NA - Not available

(1) - Cumulative volume extracted since Newmark OU System Operations Date (October 1, 2000)

(2) - The run time meters are read on the 1st of each month as close to the same time of day as possible. However, the total monthly run time for each extraction well may be higher or lower than the actual run time due to the effect of the difference in time of the day the field measurements are recorded for the beginning and end of the month.

Table 2-3
Three Month Rolling Average Extraction Volume and Extraction Rate Calculations
January 2007

Extraction Well	Run Times (Days)				Total Down Time For Last Three Months	Extraction Volumes (acre ft)				Extraction Rates (gpm)		
	November 2006	December 2006	January 2007	Total For Last Three Months		November 2006	December 2006	January 2007	Total Pumpage Last Three Months	Three Month Rolling Average Extraction Rate [3]	Design Extraction Rate (DER) Adjusted for Maintenance(TER)(1)	Difference Between Three Month Rolling Average and TER
Days in Period >>	30	31	31	92								
Newmark North Plant Extraction Well Network[3]												
EPA 006[2]	29.7	31.0	31.1	91.8	0.2	106.7	115.1	109.0	330.8			
EPA 007	29.8	31.0	31.1	91.9	0.1	179.0	193.6	193.5	566.0			
Newmark 3	29.3	31.1	31.1	91.5	0.5	121.4	136.5	137.2	395.0			
Network Total						**407.1**	**445.1**	**439.7**	**1291.9**	**3177.4**	**3526.0**	**-348.6**

Notes:

NA - Not Applicable

(1) Adjusted Design Extraction Rate = Design Extraction Rate (DER) less adjustment for the maintenance allowance. Currently this is the adjusted Target Extraction Rate (TER) agreed to during the EPA/DTSC/City meeting dated October 5, 2006. Current DER for the Newmark North Plant is 3900, the Newmark Plume Front is 8800 and the Muscoy Plume Front is 8900 prior to maintenance adjustments.

(2) This extraction well historically has been running 12 to 18 hours a day in order to avoid pump cavitation created by the depleted aquifer conditions, however currently production was increased to 24 hours a day due to stabalized water table and will be monitored closely.

(3) The Newmark North extraction well network has been unable to meet the three month rolling average TER at the time it was declared O&F through the present (see the letter to the EPA/DTSC dated July 25, 2005). The City is seeking a reduction in the TER for this extraction well network per the terms provided in the SOW. The current flow rate is consistent with the proposed revised extraction rate.

CD Consent Decree

DER Design Extraction Rate

gpm gallons per minute

O&F Operable and Functional

SOW Statement of Work (entered with CD March 23, 2005)

TER Target Extraction Rate

(3) Current three month rolling average is consistent with the proposed revised extraction rate.

Table 2- 4
Extraction Well Monitoring Results - PCE and TCE
January 2007

Extraction Well	Date Sampled	PCE Concentration (µg/L)	TCE Concentration (µg/L)
Newmark North Extraction Well Network			
EPA 006	1/10/2007	2.9	0.5
EPA 007	1/10/2007	2.7	<0.5
Newmark 3	1/10/2007	1.4	<0.5
Newmark Plume Front Extraction Well Network			
EPA 001	1/10/2007	4.7	1.5
EPA 002	1/10/2007	5.0	1.8
EPA 003	1/10/2007	NM	NM
EPA 004	1/10/2007	1.1	<0.5
EPA 005	1/10/2007	<0.5	<0.5

Notes:

These data have been collected and validated using standard SBMWD protocol as required under SBMWDs DHS Permit. Once the project QA/QC Plan has been prepared and approved, SBMWD will adhere to the QA/QC plan when sampling the extraction wells and validating laboratory data.

NM - Not monitored during the reporting period.

Table 3-1
Summary of Newmark OU O&M - GAC Treatment Plants

Reporting Period: January 1, 2007 through January 31, 2007
System Operational & Functional Date: October 1, 2000[1]
Operations Completed: 6 years 4 months

Newmark North GAC Treatment Plant	
Description Routine Maintenance Performed	Daily equipment checks performed (see DHS report). All vessels exterior washed.
Description of Problems Encountered	Encountering trouble with lifting vault lids for Chlorine injection/Cla-valve. Lids are extremely difficult to open. The inspection on December 21, 2005 determined that the lids must be replaced with torsion assist lids. Efforts to improve vault lids have been insufficient. Additional springs have been installed on one of the two lids. However, both lids cannot be operated by an individual and are unsafe. Notified Distribution to see what can be done. Operations will install remote registers external to vaults preventing personnel from entering until vault lids are addressed. Vault lid replacements were procured and Distribution will schedule repairs.
Description of Process Improvements Implemented	None
Deviations from the Operational Requirements of the Consent Decree	None
17th Street GAC Treatment Plant	
Status	The 17th Street GAC Treatment Plant is not currently treating remedy water. EPA 003 water, formerly treated at the 17th Street GAC Treatment Plant has been diverted to the Waterman treatment plant. At such time that remedy water is again treated at the 17th Street treatment plant, data will be included in this report.
Waterman GAC Treatment Plant	
Description Routine Maintenance Performed	Daily equipment checks performed (see DHS report). All vessels exterior washed.
Description of Problems Encountered	Encountering trouble with lifting vault lids for Chlorine injection/Cla-valve. Lids are extremely difficult to open. The inspection on December 21, 2005 determined that the lids must be replaced with torsion assist lids. Efforts to improve vault lids have been insufficient. Additional springs have been installed on one of the two lids. However, both lids cannot be operated by an individual and are unsafe. Notified Distribution to see what can be done. Operations will install remote registers external to vaults preventing personnel from entering until vault lids are addressed. Vault lid replacements were procured and Distribution will schedule repairs.
Description of Process Improvements Implemented	None
Deviations from the Operational Requirements of the Consent Decree	None

(1) The USEPA declared the Newmark OU Operational and Functional on October 1 ,2000.

Table 3-2
Summary of Treatment Plant Flow Data and Mass Removal Estimates
January 2007

Treatment Plant	Extraction Wells Treated By Plant	Treated Water Volumes (acre-ft)	Average Monthly Flow Rate (gpm)	Estimated Monthly GAC Mass Removal [1] (lbs)	Estimated Cumulative GAC Mass Removal[2] (lbs)
Newmark North GAC Treatment Plant	EPA 006, EPA 007 and Newmark 3	439.7	3,209.3	3.7	332.6
17th Street GAC Treatment Plant[4]		0.0	0.0	0.0	215.8
Waterman GAC Treatment Plant [3]	EPA 002, EPA 003, EPA 004 and EPA 005	556.3	4,060.2	4.3	540.2
Total		**996.0**	**7,269.6**	**8.0**	**1,088.7**

Notes:

(1) - Monthly mass removal estimates are based on Monthly Treatment Summary sheets documented in monthly DHS reports.
(2) - Cumulative mass removal estimates are for the period since Newmark was declared O&F (October 1, 2000). The historical estimate prior to Consent decree entry is based on a combination of carbon life loading history data and Monthly Treatment Summary spreadsheet.
(3) - Since the beginning of March extracted groundwater from EW-1 has been diverted to the 19th Street Treatment Plant. Therefore, the sum of volume of groundwater extracted from Newmark OU well
(4) - The 17th Street Treatment plant is currently not treating remedy water (See Table 3-1 for explanation).

Table 3-3
Treatment Plant Monitoring Results - PCE and TCE
January 2007

Treatment Plant	Date Sampled	PCE Concentration (µg/L)	TCE Concentration (µg/L)
Newmark North GAC Treatment Plant			
Combined Extraction Well Influent	10-Jan-07	2.6	<0.5
Lead Vessel Effluent 1	10-Jan-07	2.1	0.7
Lead Vessel Effluent 2	10-Jan-07	2.1	<0.5
Lead Vessel Effluent 3	10-Jan-07	1.9	<0.5
Lead Vessel Effluent 4	10-Jan-07	1.7	<0.5
Lead Vessel Effluent 5	10-Jan-07	2.0	<0.5
Lead Vessel Effluent 6	10-Jan-07	1.6	<0.5
Lead Vessel Effluent 7	10-Jan-07	1.8	<0.5
Combined Treatment Plant Effluent	4-Jan-07	<0.5	<0.5
	10-Jan-07	<0.5	<0.5
	18-Jan-07	<0.5	<0.5
	25-Jan-07	<0.5	<0.5
17th Street GAC Treatment Plant(1)			
Combined Extraction Well Influent	10-Jan-07	NM	NM
Lead Vessel Effluent 1	10-Jan-07	NM	NM
Lead Vessel Effluent 2	10-Jan-07	NM	NM
Lead Vessel Effluent 3	10-Jan-07	NM	NM
Combined Treatment Plant Effluent	4-Jan-07	NM	NM
	10-Jan-07	NM	NM
	18-Jan-07	NM	NM
	25-Jan-07	NM	NM
Waterman GAC Treatment Plant			
Combined Extraction Well Influent	10-Jan-07	2.2	0.6
Lead Vessel Effluent 1	10-Jan-07	2.6	1.0
Lead Vessel Effluent 2	10-Jan-07	1.8	0.8
Lead Vessel Effluent 3	10-Jan-07	2.4	0.8
Lead Vessel Effluent 4	10-Jan-07	2.6	0.8
Lead Vessel Effluent 5	10-Jan-07	1.9	0.9
Lead Vessel Effluent 6	10-Jan-07	1.9	0.8
Lead Vessel Effluent 7	10-Jan-07	2.7	1.0
Lead Vessel Effluent 8	10-Jan-07	2.7	0.9
Combined Treatment Plant Effluent	4-Jan-07	<0.5	<0.5
	10-Jan-07	<0.5	<0.5
	18-Jan-07	<0.5	<0.5
	25-Jan-07	<0.5	<0.5

Notes:

These data have been collected and validated using standard SBMWD protocol as required under SBMWDs DHS Permit. Once the project QA/QC Plan has been prepared and approved, SBMWD will adhere to the QA/QC plan when sampling the extraction wells and validating data.

NM - Not monitored during the reporting period

(1) - The 17th Street treatment plant is not currently being used to treat remedy water (see explanation in Table 3-1). As such, plant influent and effluent are currently not being monitored as part of remedy operations

Table 4-1
Summary of Newmark OU O&M - Water Level Monitoring

Reporting Period: January 1, 2007 through January 31, 2007
System Operation Date: October 1, 2000
Operations Completed: 6 years 4 months

Newmark and Muscoy OU Monitoring Wells	
Description of Routine Monitoring and Maintenance Performed	Periodic download of RTU based water level data and RTU hardware, software and sensors checks. Collection of manual water levels to verify RTU based readings.
Description of Problems Encountered	None
Description of Process Improvements Implemented	None
Deviations from the Operational Requirements of the Consent Decree	None. Daily water level readings were collected each day as required by the SOW.
Newmark and Muscoy OU Extraction Wells	
Description Routine Monitoring and Maintenance Performed	Periodic download of water level data from RTUs as part of the completion of the Muscoy OU startup aquifer testing (per the schedule in the EPA/URS Field Sampling Plan) and less frequently for extraction wells monitored as part of Newmark OU IRA operations.
Description of Problems Encountered	EPA109PA, PB and PC - Water level sensors failed due to RTU Problem - 1/23/2007
Description of Process Improvements Implemented	Completed repair of EPA109 RTU on 2/01/2007
Deviations from the Operational Requirements of the Consent Decree	None. Daily water level readings were collected each day as required by the SOW.
Site-Wide Monitoring Wells	
Description Routine Monitoring and Maintenance Performed	Collected monthly manual water level measurements on January 16, 2007
Description of Problems Encountered	The City is unable to collect Site-Wide manual water levels from some of the wells designated in the SOW due to access limitations, water level depths beyond the length of the sounding tape or omissions. See list below.
Description of Process Improvements Implemented	Telecommunication improvement project in progress.
Deviations from the Operational Requirements of the Consent Decree	The Site-Wide manual water levels were not collected from the following wells: MW 126 (well appears to be dry), PZ-124 (well appears to be dry,). Muscoy Mutual No. 5 (air line installed by Muscoy Mutual prevents the lowering of the sounding tape and we are not authorized to remove. The City used the new segmented probe sounder to monitor this well and it too proved unsuccessful, in fact the new sounder got hung up inside the casing of the well the same as the other sounders. The modified tape approach was unsuccessful as well. The City gained access to the 2" tap thought the air release valve and tried several tapes and still could not get a reading. The City continues to develop alternative methods to monitor this well.
Wells Monitored Voluntarily	
Description of Routine Monitoring and Maintenance Performed	Collected monthly manual water level measurements. Downloaded electronic water level data from USGS website.
Description of Problems Encountered	None

Table 6-1
Schedule of Upcoming O&M, Monitoring and Reporting Events
Planning Period: February/March 2007

Task/Item	Planned Event
Newmark OU Extraction Wells	
Pump/Well Maintenance	EPA 003 change out equipment- pump, motor, drive & Edison service. Install isolation transformer to pump to the Waterman Plant. Work began on EPA 003 on 12/11/06.
Electrical/Controller Maintenance	Routine preventative maintenance, repair as needed.
SCADA System and RTU System Maintenance	Overall system check- Hardware, software, instrumentation, radio communications. Repair as needed.
Extraction Well Monitoring	Download water level data and check RTU offsets.
Other	None
Newmark OU Treatment Plants	
Carbon Change Outs	None
Electrical/Controller Maintenance	None
SCADA System and RTU System Maintenance	Overall system check- Hardware, software, instrumentation, radio communications. Repair as needed.
Treatment System Monitoring	Routine treatment plant sampling
Other	Vault lid repairs
Monitoring Wells	
SCADA System and RTU System Maintenance	Overall system check- Hardware, software, instrumentation, radio communications. Repair as needed
Water Level Monitoring - SCADA Wells	Download water level data and check elevation offsets. Troubleshoot and repair transducers as needed.
Water Level Monitoring - Site-Wide Well	Collect monthly manual water levels
Monitoring Well sampling	EPA/URS sampling will be performed per the EPA schedule in support of the Muscoy OU one-year performance evaluation.
Other	Install enclosure moisture prevention and venting applications.
Project Documents	
Progress Report - February 2007	Scheduled to be submitted March 31, 2007. (1)
Community Relations	
Fact Sheets	None planned.
Community Meetings	None planned

(1) The SOW requires monthly progress reports be submitted 45 days after the subject data period. The SOW also requires flow and water level data be submitted 30 days after the reporting period. This progress report includes both data sets and therefore must be submitted in compliance with the most restrictive due date which is 30 days after the reporting period.

Table 6-2
Submittal of Deliverables/Documents

Deliverable	Date Submitted	Status
Groundwater Modeling Work Plan	April 15, 2005	Approved by EPA in Correspondence Dated May 26, 2005
Transmittal of Treatment Plant and Extraction Well Flow Data - March/April 2005	May 31, 2005	Submitted to EPA and DTSC.
Progress Report - March/April 2005- No. 1	June 14, 2005	Submitted to EPA and DTSC. This is the first monthly progress report submitted. Review and comment pending.
Letter requesting an extension for QA/QC Plan Submittal	June 15, 2005	Submitted to EPA and DTSC./ Verbal extension granted by EPA June 2005
Health and Safety Plan	June 17, 2005	Submitted to EPA and DTSC.
Operations and Maintenance Plan	June 17, 2005	Submitted to EPA and DTSC. EPA provided comments on 7/31/06.
Time Line and Schedule	June 21, 2005	Submitted to EPA and DTSC.
Staffing Plan	June 21, 2005	Submitted to EPA and DTSC.
Progress Report - May 2005 - No. 2	June 30, 2005	Submitted to EPA and DTSC.
North Plant Target Extraction Rate Notification	July 25, 2005	Submitted to EPA and DTSC.
Progress Report - June 2005 - No. 3	July 31, 2005	Submitted to EPA and DTSC
Progress Report - July 2005 - No. 4	August 31, 2005	Submitted to EPA and DTSC
Letter requesting an extension for Baseline Mitigation Plan Submittal	September 22, 2005	Submitted to EPA and DTSC/ Extension approved by EPA- September 27,2005
Progress Report - August 2005- No. 5	September 30, 2005	Submitted to EPA and DTSC
Letter requesting an extension for the OSAP and the QA/QC Plan	October 5, 2005	Submitted to EPA and DTSC/ Extension approved by EPA- October 14,2005
Progress Report - September 2005 - No. 6	October 31, 2005	Submitted to EPA and DTSC
Letter requesting an extension for the OSAP and the QA/QC Plan	November 8, 2005	Submitted to EPA and DTSC/ Extension approved by EPA- November 17,2005
Coordination Plan for November Sampling Event	November 8, 2005	Submitted to EPA
Operational Sampling Analysis Plan (OSAP)	November 8, 2005	Submitted to EPA and DTSC. EPA provided comments on 7/31/06.
Quality Assurance/Quality Control Plan (QA/QC)	November 21, 2005	Submitted to EPA and DTSC. EPA provided comments on 7/31/06.
Progress Report - October 2005 - No. 7	November 30, 2005	Submitted to EPA and DTSC
North Plant Target Extraction Rate -Sustainable Rates Letter	December 5, 2005	Submitted to EPA and DTSC
Preliminary Review of the Muscoy OU Capture Analysis Reports (August and September 2005)	December 6, 2005	Submitted To EPA and DTSC
Progress Report - November 2005 - No. 8	December 20, 2005	Submitted to EPA and DTSC
Letter requesting an extension of time for the Baseline Mitigation Plan	January 19, 2006	Submitted to EPA and DTSC
Progress Report - December 2005 - No. 9	January 30, 2006	Submitted to EPA and DTSC
Progress Report - January 2006 - No. 10	February 28, 2006	Submitted to EPA and DTSC
Preliminary Draft Baseline Mitigation Plan	March 1, 2006	Submitted to EPA and DTSC
Progress Report - February 2006 - No. 11	March 30, 2006	Submitted to EPA and DTSC
Draft Baseline Mitigation Plan	March 30, 2006	Submitted to EPA and DTSC. EPA provided comments on 7/31/06.
Response to EPA QAO comments on SBMWD QA/QC and OSAP	April 10, 2006	Submitted to EPA and DTSC. EPA provided comments on 7/31/06.
Letter proposing Operations and Monitoring Modifications .	April 25, 2006	Submitted to EPA and DTSC

Table 6-2
Submittal of Deliverables/Documents

Deliverable	Date Submitted	Status
Progress Report - March 2006 - No. 12	April 28, 2006	Submitted to EPA and DTSC
Progress Report - April 2006 - No. 13	May 31, 2006	Submitted to EPA and DTSC
Revised letter proposing Operations and Monitoring Modifications	May 31, 2006	Submitted to EPA and DTSC
Progress Report - May 2006 - No. 14	June 30, 2006	Submitted to EPA and DTSC
SBMWD comments on Pre-Draft November 2005 Monthly Status Report	July 10, 2006	Submitted to EPA and DTSC
City's Response to Comments on Operations and Monitoring Modifications	July 25, 2006	Submitted to EPA and DTSC
Progress Report - June 2006 - No. 15	July 31, 2006	Submitted to EPA and DTSC
SBMWD comments on Draft Extraction and Monitoring Well Installation Report	August 29, 2006	Submitted to EPA and DTSC
Progress Report - July 2006 - No. 16	August 30, 2006	Submitted to EPA and DTSC
Progress Report - August 2006 - No. 17	September 28, 2006	Submitted to EPA and DTSC
Progress Report - September 2006 - No. 18	October 30, 2006	Submitted to EPA and DTSC
Progress Report - October 2006 - No. 19	November 30, 2006	Submitted to EPA and DTSC
Progress Report - November 2006 - No. 20	December 29, 2006	Submitted to EPA and DTSC
Progress Report - December 2006 - No. 21	January 30, 2007	Submitted to EPA and DTSC
Progress Report - January 2007 - No. 22	March 1, 2007	Submitted to EPA and DTSC

Table 6-3
Summary of Newmark Groundwater Flow Model Construction Activities
January 2007

Modeling Component	Progress Summary
Activities Conducted During The Reporting Period	
Data Compilation	1) Received and documented 2006 data requests. 2) Identified data gaps and developed strategy to fill gaps 3) Entered production and water level data into database 4) Performed error checking and data validation with the existing data sets
Conceptual Model Development	No activities performed during this reporting period
Model Construction	1) Continued iterative process of modifying , constructing files, simulating and reviewing results for calibration simulation of Runs 10 and 11 2) Prepared input files for sensitivity analysis on stream bed conductance during wet years 3) Prepared data sets and developed regression analysis to fill data gaps 4) Identified simulation discrepancies in constant flux package and recharge package and constructed repaired model files
Model Calibration	1) Prepared run logs and continued calibration process on Run 10 - monthly stress period calibration 2) Preformed data reduction on multiple runs comparing calibration statistics and quantitative and qualitative calibration criteria
Meetings	No meetings scheduled for this period.
Activities Planned/Conducted in February/March 2007	
Data Compilation	1) Continue to catalogue data received to date 2) Coordinate data collection activities with cooperative agencies (Geoscience Support Services, Western-San Bernardino Watermaster and San Bernardino Valley Municipal Water District
Conceptual Model Development	2) Review calibration results and compare to current understanding of facies and depositional environments
Model Construction	1) Continue to methodically refine model as follows and calibrate to the refined monthly stress period 2) set up and simulate calibration Run 11 3) Set up and simulate verification Run 12 4) Begin sensitivity analysis
Model Calibration	1) Continue to execute the Calibration Plan checking each benchmark simulation against calibration criteria 2) Perform sensitivity analysis on key parameters
Meetings	Working Group conference call tentatively scheduled for March, 2007.

Note:

The Newmark Groundwater Flow Model is being co-developed with the Regional Basin Flow Model. As such, the City of San Bernardino Water Department's consultant (SECOR) is working jointly with San Bernardino Valley Municipal Water District's consultant (GEOSCIENCE Support Services) to fulfill both parties' modeling objectives. This table provides a summary of the activities performed and activities planned in support of this joint venture.